



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/565,556	01/23/2006	Kouichi Teramae	060066	2112
23850 7590 08/05/2008 KRATZ, QUINTOS & HANSON, LLP 1420 K Street, N.W. Suite 400 WASHINGTON, DC 20005				
EXAMINER				
ELFERVIG, TAYLOR A				
ART UNIT		PAPER NUMBER		
4127				
MAIL DATE		DELIVERY MODE		
08/05/2008		PAPER		

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/565,556

**Applicant(s)**

TERAMAE ET AL.

**Examiner**

TAYLOR ELFERVIG

**Art Unit**

4127

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 23 January 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-9 and 12-31 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-9, 12-19 and 22-31 is/are rejected.
- 7) ☒ Claim(s) 20 and 21 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 23 January 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date 01/23/2006
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### ***Claim Rejections - 35 USC § 101***

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

**Claims 8, 9, 13, 14 and 26-31** rejected under 35 U.S.C. 101 because the claimed invention embodies an abstract idea where no physical transformation occurs which is one of the Judicial exceptions as set forth in the Manual of Patent Examination Procedure (MPEP) § 2106. The previously mentioned claims are in conflict with 35 U.S.C. 101 because of the use of the term or phrase "computer program" in the aforementioned claims. It has been interpreted by the examiner that "computer program" means computer code. It has been interpreted by the examiner that "computer program" is performing the elements of the aforementioned claims. It is the conclusion of the examiner that this is a direct violation of 35 U.S.C. 101 because this represents an abstract idea where no physical transformation occurs.

Pursuant to the guidelines set forth in MPEP § 2106, the examiner has made the following analysis.

The examiner has determined that applicant's claim invention is a "multimedia network management system" that uses an aggregated list of devices and media content. The examiner has also determined that the applicant's claimed invention uses a master/slave architecture where the master manages the aggregated list and distributes the list to the slaves and the slaves manage their own content lists and distributes them to the master. Furthermore, the examiner has determined that the

"multimedia network management system" has efficiency features, such as, making the most suitable machine the master and moving popular files to a machine with greater processing capabilities.

A thorough search of the prior art has been conducted. Please see IFW-Search Notes.

The claimed invention does fall within at least one of the enumerated statutory categories. The claimed invention is a master device, a computer program, a network system and a method.

The claimed invention does fall within at least one of the Judicial Exceptions as set forth in 35 U.S.C. 101. The examiner has interpreted the following claims usage of "computer program" as an abstract idea and having no physical transformation.

As to **claim 8**, the claim limitation reads, "A computer program for managing files of a master device for multimedia information which is connected via a network to at least one slave device for multimedia information, the computer program executing a processor of the master device in a process comprising: generating a self directory list by retrieving the files stored in a memory of the master device; collecting a directory list of the slave device by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device; generating an integrated directory list by integrating the self directory list of the master device and the directory list collected from the slave device; and retrieving and displaying the integrated directory list." There is no physical transformation occurring.

As to **claim 9**, the claim limitation reads, "A computer program according to claim 8 further executing the processor in a process comprising distributing the integrated directory list to the slave device via the network." There is no physical transformation occurring.

As to **claim 13**, the claim limitation reads, "A computer program according to claim 8, wherein conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving and displaying." There is no physical transformation occurring.

As to **claim 14**, the claim limitation reads, "A computer program according to claim 8, wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying." There is no physical transformation occurring.

As to **claim 26**, the claim limitation reads, "A computer program for managing files of a slave device for multimedia information connected via a network to a master device for multimedia information, wherein the master device comprising: means for generating a self directory list by retrieving files stored in a memory of the master device; means for collecting a directory list of the slave device by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device; means for generating an integrated directory list by integrating the self directory list of the master device and the directory list collected from the slave device; and means for retrieving and displaying the integrated directory list, the computer program executing a processor of the slave device in a process

comprising: generating the self directory list by retrieving the files stored in the memory of the slave device; and distributing the self directory list to the master device via the network." There is no physical transformation occurring.

As to **claim 27**, the claim limitation reads, "A computer program for managing files of a slave device for multimedia information connected via a network to a master device for multimedia information, wherein the master device comprising: means for generating a self directory list by retrieving files stored in a memory of the master device; means for collecting a directory list of the slave device by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device; means for generating an integrated directory list by integrating the self directory list of the master device and the directory list collected from the slave device; means for retrieving and displaying the integrated directory list; and means for distributing the integrated directory list to the slave device via the network; the computer program executing a processor of the slave device in a process comprising: generating the self directory list by retrieving the files stored in the memory of the slave device; and distributing the self directory list to the master device via the network." There is no physical transformation occurring.

As to **claim 28**, the claim limitation reads, "A computer program according to claim 9, wherein conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving and displaying." There is no physical transformation occurring.

As to **claim 29**, the claim limitation reads, "A computer program according to claim 12, wherein conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving and displaying." There is no physical transformation occurring.

As to **claim 30**, the claim limitation reads, "A computer program according to claim 9, wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying." There is no physical transformation occurring.

As to **claim 31**, the claim limitation reads, "A computer program according to claim 12, wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying." There is no physical transformation occurring.

### ***Claim Rejections - 35 USC § 102***

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

3. **Claims 1, 2, 22, 6, 7, 8, 9, 13 and 28** are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*").

As to **claim 1**, *Phan* teaches a master device for multimedia information which is connected to at least one slave device for multimedia information via a network comprising:

means for generating a self directory list (150) (Fig. 3, ¶0043) by retrieving files stored in a memory (176) of the master device (50) (Fig. 3, Fig. 4, ¶0044);

means for collecting a directory list of the slave device (156, 158) by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device (Fig. 3, ¶0050);

means for generating an integrated directory list (151) by integrating the self directory list (150) of the master device (50) and the directory list (156, 158, 160) collected from the slave device (56, 58, 60) (Fig. 3, ¶0043); and

means for retrieving (174) and displaying (52) the integrated directory list (Fig. 4, ¶0044, ¶0047).

As to **claim 2**, *Phan* teaches a means for distributing the integrated directory list to the slave device via the network (¶0052, ¶0053). Here, *Phan* discloses that each control point will be presented with a consistent master CDS, having the same organization and categorization.

As to **claim 22**, *Phan* teaches conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot



displayed on the means for retrieving (56) and displaying (54). (Fig. 3, ¶0060).

Examiner has interpreted this language to mean a search or query of the integrated directory list.

As to **claim 6**, *Phan* teaches conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving (56) and displaying (54). (Fig. 3, ¶0060) . Examiner has interpreted this language to mean a search or query of the integrated directory list.

As to **claim 7**, *Phan* teaches conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying (¶0050, ¶0051). Examiner has interpreted this language to mean predefined search or query conditions to limit or restrict the file return from the integrated directory list.

As to **claim 8**, *Phan* teaches a computer program for managing files of a master device for multimedia information which is connected via a network to at least one slave device for multimedia information, the computer program executing a processor of the master device in a process comprising:

generating a self directory list (150) (Fig. 3, ¶0043) by retrieving the files stored in a memory (176) of the master device (50) (Fig. 4, ¶0044);

collecting a directory list of the slave device (156, 158) by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device (Fig. 3, ¶0050);

generating an integrated directory list (151) by integrating the self directory list (150) of the master device (50) and the directory list (156, 158, 160) collected from the slave device (56, 58, 60) (Fig. 3, ¶0043); and

retrieving (174) and displaying (52) the integrated directory list (Fig. 4, ¶0044, ¶0047).

As to **claim 9**, *Phan* teaches distributing the integrated directory list to the slave device via the network (¶0052, ¶0053).

As to **claim 13**, *Phan* teaches computer program according to claim 8, wherein conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving (56) and displaying (54). (Fig. 3, ¶0060). Examiner has interpreted this language to mean a search or query of the integrated directory list.

As to **claim 28**, *Phan* teaches a computer program according to claim 9, wherein conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving (56) and displaying (54). (Fig. 3, ¶0060). Examiner has interpreted this language to mean a search or query of the integrated directory list.

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. **Claims 3, 4, 5, 12, 15, 16, 23, 26, 27 and 29** are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*") in view of U.S. Patent No. 5,630,116 to *Takaya et al.* ("*Takaya*").

As to **claim 3**, *Phan* discloses a master device for multimedia information which is connected to at least one slave device for multimedia information via a network as discussed in claim 1; and

A means for distributing the self directory list to the master device via the network (§10049). Here, distributing has been interpreted as sending information as a response to a request.

*Phan* does not expressly disclose a means for generating a self directory list by retrieving files stored in a memory of the slave device. However, *Phan* does teach that each network device has its own file list and implies that the file list was generated by the slave.

*Takaya* discloses a means for generating a self directory list by retrieving files stored in a memory of the slave device (col. 2 ll. 55-57). Here, self directory list is termed slave list file.

*Phan* and *Takaya* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate a slave device which distributes its own directory listing, as discussed in *Takaya*, into the master/slave system, as discussed in *Phan*. The suggestion/motivation would have been compare what is held on the slave computer and what is on the master computer (col. 4 ll. 6-26).

As to **claim 4**, similar rejection as to claim 3. The suggestion/motivation would have been the same as in claim 3.

As to **claim 5**, *Phan* teaches the slave device further comprises:

means for retrieving and displaying the integrated directory list which is distributed via the network by the master device for multimedia information (§0052, §0053, §0060).

As to **claim 12**, *Phan* teaches retrieving and displaying the integrated directory list which is distributed via the network by the master device (Fig. 4, §0044, §0047).

As to **claim 15**, *Phan* teaches a network system in which one or a plurality of slave devices and one master device for multimedia information are connected by a network,

wherein the master device comprises:

means for generating a self directory list (150) (Fig. 3, ¶0043) by retrieving files stored in a memory (176) of the master device (50) (Fig. 4, ¶0044);

means for collecting a directory list of the slave device (156, 158) by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device (Fig. 3, ¶0050);

means for generating an integrated directory list (151) by integrating the self directory list (150) of the master device (50) and the directory list (156, 158, 160) collected from the slave device (56, 58, 60) (Fig. 3, ¶0043);

means for distributing the integrated directory list to the slave device via the network (¶0052, ¶0053); and

means for retrieving (174) and displaying (52) the integrated directory list (Fig. 4, ¶0044, ¶0047),

wherein the slave device comprises:

means for distributing the self directory list to the master device via the network (§§0049). Here, distributing has been interpreted as sending information as a response to a request.

means for retrieving and displaying the integrated directory list which is distributed via the network by the master device for multimedia information (§§0052, §§0053, §§0060).

*Phan* does not expressly disclose wherein the slave device comprises: means for generating a self directory list by retrieving file stored in memory of the slave device; and wherein at least one of the slave devices and the master device each possess the integrated directory list in a synchronized form. However, *Phan* does teach that each network device has its own file list and implies that the file list was generated by the slave and *Phan* also teaches that a master device has a consolidated master CDS which is a compilation of all the network content.

*Takaya* discloses wherein the slave device comprises:

means for generating a self directory list by retrieving file stored in memory of the slave device (col. 2 ll. 55-57). Here, self directory list is termed slave list file; and

wherein at least one of the slave devices and the master device each possess the integrated directory list in a synchronized form (col. 4 ll. 6-26). Here, integrated directory list is termed master list file.

*Phan* and *Takaya* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate a slave device which distributes its own directory listing, as discussed in *Takaya*, into the master/slave system, as discussed in *Phan*. The suggestion/motivation would have been compare what is held on the slave computer and what is on the master computer (col. 4 ll. 6-26).

As to **claim 16**, *Phan* teaches a method for managing a file in a network system, in which one or a plurality of slave devices and one master device for multimedia information are connected by the network,

wherein the master device comprises:

means for generating a self directory list (150) (Fig. 3, ¶0043) by retrieving files stored in a memory (176) of the master device (50) (Fig. 4, ¶0044);

means for collecting a directory list of the slave device (156, 158) by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device (Fig. 3, ¶0050);

means for generating an integrated directory list (151) by integrating the self directory list (150) of the master device (50) and the directory list (156, 158, 160) collected from the slave device (56, 58, 60) (Fig. 3, ¶0043);

means for distributing the integrated directory list to the slave device via the network (¶0052, ¶0053); and

means for retrieving (174) and displaying (52) the integrated directory list (Fig. 4, ¶0044, ¶0047),

wherein the slave device comprises:

means for distributing the self directory list to the master device via the network (¶0049). Here, distributing has been interpreted as sending information as a response to a request.

means for retrieving and displaying the integrated directory list which is distributed via the network by the master device for multimedia information (¶0052, ¶0053, ¶0060).

the method comprising the steps of:

when a change occurs in the directory list of the master device, updating the integrated directory list based on the change (Fig. 6, ¶0056, ¶0057);



when a change occurs in the directory list of one slave device, notifying the master device of the change, collecting the directory list of the slave device and updating the integrated directory list based on the collected directory list (Fig. 6, ¶0056, ¶0057); and

*Phan* does not expressly disclose a means for generating a self directory list by retrieving file stored in memory of the slave device; wherein at least one of the slave devices and the master device each possess the integrated directory list in a synchronized form; and distributing the updated integrated directory list to at least one of the slave devices. However, *Phan* does teach that each network device has its own file list and implies that the file list was generated by the slave and *Phan* also teaches that a master device has a consolidated master CDS which is a compilation of all the network content.

*Takaya* discloses means for generating a self directory list by retrieving file stored in memory of the slave device (col. 2 ll. 55-57). Here, self directory list is termed slave list file;

wherein at least one of the slave devices and the master device each possess the integrated directory list in a synchronized form (col. 4 ll. 6-26). Here, integrated directory list is termed master list file, and

distributing the updated integrated directory list to at least one of the slave devices (col. 4 ll. 6-26, 54-67; col. 5 ll. 1-13).

*Phan* and *Takaya* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate a slave device which distributes its own directory listing, as discussed in *Takaya*, into the master/slave system, as discussed in *Phan*. The suggestion/motivation would have been compare what is held on the slave computer and what is on the master computer (col. 4 ll. 6-26).

As to **claim 23**, *Phan* teaches a conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving (56) and displaying (54). (Fig. 3, ¶0060). Examiner has interpreted this language to mean a search or query of the integrated directory list. The suggestion/motivation would have been the same as in claim 3.

As to **claim 26**, *Phan* teaches a computer program for managing files of a slave device for multimedia information connected via a network to a master device for multimedia information,

wherein the master device comprising:

means for generating a self directory list by retrieving files stored in a memory of the master device (Fig. 3, ¶0042, ¶0043);

means for collecting a directory list of the slave device by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device (§§0050);

means for generating an integrated directory list by integrating the self directory list of the master device and the directory list collected from the slave device (Fig. 3, §§0043); and

means for retrieving and displaying the integrated directory list (Fig. 4, §§0044, §§0047),

the computer program executing a processor of the slave device in a process comprising:

distributing the self directory list to the master device via the network (§§0049). Here, distributing has been interpreted as sending information as a response to a request.

*Phan* does not expressly disclose a means for generating a self directory list by retrieving file stored in memory of the slave device. However, *Phan* does teach that each network device has its own file list and implies that the file list was generated by the slave.

*Takaya* discloses means for generating a self directory list by retrieving file stored in memory of the slave device (col. 2 ll. 55-57). Here, self directory list is termed slave list file.

*Phan* and *Takaya* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate a slave device which distributes its own directory listing, as discussed in *Takaya*, into the master/slave system, as discussed in *Phan*. The suggestion/motivation would have been compare what is held on the slave computer and what is on the master computer (col. 4 ll. 6-26).

As to **claim 27**, *Phan* teaches a computer program for managing files of a slave device for multimedia information connected via a network to a master device for multimedia information,

wherein the master device comprising:

means for generating a self directory list (150) (Fig. 3, ¶0043) by retrieving files stored in a memory (176) of the master device (50) (Fig. 4, ¶0044);

means for collecting a directory list of the slave device (156, 158) by at least one of retrieving files stored in a memory of the slave device and receiving the directory list generated by the slave device (Fig. 3, ¶0050);

means for generating an integrated directory list (151) by integrating the self directory list (150) of the master device (50) and the directory list (156, 158, 160) collected from the slave device (56, 58, 60) (Fig. 3, ¶0043);

means for distributing the integrated directory list to the slave device via the network (¶0052, ¶0053); and

means for retrieving (174) and displaying (52) the integrated directory list (Fig. 4, ¶0044, ¶0047),

wherein the slave device comprises:

the computer program executing a processor of the slave device in a process comprising:

distributing the self directory list to the master device via the network (¶0049). Here, distributing has been interpreted as sending information as a response to a request.

*Phan* does not expressly disclose generating a self directory list by retrieving file stored in memory of the slave device. However, *Phan* does teach that each network device has its own file list and implies that the file list was generated by the slave.

*Takaya* discloses generating a self directory list by retrieving file stored in memory of the slave device (col. 2 ll. 55-57). Here, self directory list is termed

slave list file. *Phan* and *Takaya* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate a slave device which distributes its own directory listing, as discussed in *Takaya*, into the master/slave system, as discussed in *Phan*. The suggestion/motivation would have been compare what is held on the slave computer and what is on the master computer (col. 4 ll. 6-26).

As to **claim 29**, *Phan* teaches a computer program according to claim 12, wherein conditions established for retrieving the integrated directory list are defined by data which is entered via an input slot displayed on the means for retrieving (56) and displaying (54). (Fig. 3, ¶0060). Examiner has interpreted this language to mean a search or query of the integrated directory list.

6. **Claims 14, 24 and 30** are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*") in view of U.S. Patent Application Publication No. 2005/0010671 A1 to *Grannan* ("*Grannan*").

As to **claim 14**, *Phan* discloses a computer program for managing files of a master device for multimedia information which is connected via a network to at least one slave device for multimedia information as discussed in claim 8.

*Phan* does not expressly disclose wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying.

*Grannan* teaches wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying (§0050, §0051). Examiner has interpreted this language to mean predefined search or query conditions to limit or restrict the file return from the integrated directory list. Here, *Grannan* discloses the use of standard search requests that are used for retrieving specific media types.

*Phan* and *Grannan* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate the preset search limitations of *Grannan* with the master/slave system discussed in *Phan*. The suggestion/motivation would have been to display only relevant or particular files (§0050).

As to **claim 24**, *Grannan* teaches conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying (§¶0050, §¶0051). Examiner has interpreted this language to mean predefined search or query conditions to limit or restrict the file return from the integrated directory list. Here, *Grannan* discloses the use of standard search requests that are used for retrieving specific media types. The motivation/suggestion is the same as claim 14.

As to **claim 30**, *Grannan* teaches a computer program according to claim 9, wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying (§¶0050, §¶0051). Examiner has interpreted this language to mean predefined search or query conditions to limit or restrict the file return from the integrated directory list. Here, *Grannan* discloses the use of standard search requests that are used for retrieving specific media types. The motivation/suggestion is the same as claim 14.

7. **Claims 25 and 31** are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*") in view of U.S. Patent No. 5,630,116 to *Takaya et al.* ("*Takaya*") in further view of U.S. Patent Application Publication No. 2005/0010671 A1 to *Grannan* ("*Grannan*").



As to **claim 25**, *Phan and Takaya* discloses a computer program for managing files of a master device for multimedia information which is connected via a network to at least one slave device for multimedia information as discussed in claim 1, claim 2, claim 4 and claim 5.

*Phan and Takaya* do not expressly disclose conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying.

*Grannan* teaches conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying (§0050, §0051). Examiner has interpreted this language to mean predefined search or query conditions to limit or restrict the file return from the integrated directory list.

*Phan, Takaya and Grannan* are analogous art because they are from the same field of endeavor with respect to master/slave network architecture and file management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to use the preset search limitations of *Grannan* within the incorporation of a slave device which distributes its own directory listing, as discussed in *Takaya*, into the master/slave system, as discussed in *Phan*. The suggestion/motivation would have been compare what is held on the slave

computer and what is on the master computer (*Takaya*, col. 4 ll. 6-26) and then to display only relevant or particular files (*Grannan*, ¶0050).

As to **claim 31**, *Phan and Takaya* discloses a computer program for managing files of a master device for multimedia information which is connected via a network to at least one slave device for multimedia information as discussed in claim 1, claim 2, claim 4 and claim 5.

*Phan and Takaya* do not expressly disclose conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying.

*Grannan* teaches a computer program according to claim 12, wherein conditions established for retrieving the integrated directory list are defined by data which is memorized beforehand in a memory of the means for retrieving and displaying (¶0050, ¶0051). Examiner has interpreted this language to mean predefined search or query conditions to limit or restrict the file return from the integrated directory list. The suggestion/motivation is the same as that in claim 25.

8. **Claim 17** is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*") in view of U.S. Patent No. 5,630,116 to *Takaya et al.* ("*Takaya*") in further view of U.S. Patent Application Publication No. 2005/0262216 A1 to *Kashiwabara et al.* ("*Kashiwabara*").

As to **claim 17**, *Phan and Takaya* discloses a method for managing a file in a network system, in which one or a plurality of slave devices and one master device for multimedia information are connected by the network as discussed in claim 16, and;

*Phan* discloses when a new device for multimedia information is connected to the network system, notifying the master device of the new connection (§0015). Here, a notification is sent to all control points in the system which would entail notifying the master.

*Phan* also discloses collecting a directory list of the new device based on notification provided by the new device (§0020).

*Phan* also discloses distributing the integrated directory list which the master device possesses to the new device (§0052, §0053). Here, the consolidated master CDS is sent to all control points. A new device would receive the consolidated master CDS.

*Phan and Takaya* do not expressly disclose comparing scores of master adaptability written on directory lists of the master device and the new device;

when the score of the new device is higher than the score of the master device, notifying the new device of replacement of a master, distributing the integrated directory list which the master device possesses to the new device, and starting the new device acting as a master device; and

when the score of the new device is not higher than the score of the master device, starting the new device acting as a slave device.

*Kashiwabara* discloses comparing scores of master adaptability written on directory lists of the master device and the new device (§§0045, §0046);

when the score of the new device is higher than the score of the master device (§§0045, §0046), notifying the new device of replacement of a master (§§0049, §0050), and starting the new device acting as a master device (§0050); and

when the score of the new device is not higher than the score of the master device, starting the new device acting as a slave device (Abstract, §§0045, §0046, Fig. 6). Here, it reads that if a more suitable device is found then the new device will be the new master which infers that if the new device is not a more suitable device then the new device will be a slave.

*Phan, Takaya and Kashiwabara* are analogous art because they are from the same field of endeavor with respect to master/slave system architecture.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate the master/slave switch-off as discussed in *Kashiwabara* within the master device system discussed in *Phan and Takaya*. The suggestion/motivation would have been to keep a network's performance as at its peak and having a system that can pick the most suitable machine to act as the master would help accomplish this (§0004).

9. **Claim 18** is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*") in view of U.S. Patent No. 5,630,116 to *Takaya et al.* ("*Takaya*") in further view of U.S. Patent Application Publication No. 2002/0055978 A1 to *Joon-Bo et al.* ("*Joon-Bo*").

As to **claim 18**, *Phan and Takaya* discloses a method for managing a file in a network system, in which one or a plurality of slave devices and one master device for multimedia information are connected by the network as discussed in claim 16.

*Phan* also discloses distributing an updated integrated directory list, from which the directory list of the master device is removed, to the extracted device (§0052, §0053). Here, the consolidated master CDS is sent to all control points. A new device would receive the consolidated master CDS.

*Phan and Takaya* do not expressly disclose when the master device withdraws from the network, extracting a device which has a highest score of master adaptability second to the master device, notifying the extracted device of replacement of a master, and distributing an updated integrated directory list, from which the directory list of the master device is removed, to the extracted device; and

starting the device, which has received the updated integrated directory list, acting as a master device.

*Joon-Bo* teaches when the master device withdraws from the network, extracting a device which has a highest score of master adaptability second to the master device (§¶0046, ¶0049), notifying the extracted device of replacement of a master (Fig. 6, ¶0049), and

starting the device, which has received the updated integrated directory list, acting as a master device (§¶0049).

*Phan, Takaya and Joon-Bo* are analogous art because they are from the same field of endeavor with respect to master/slave system architecture.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate the master/slave hand-off as discussed in *Joon-Bo* within the master device system discussed in *Phan and Takaya*. The suggestion/motivation would have been a need to hand-off the function of the master to the next most capable machine while the previous master is offline so network connections aren't broken (§¶0040).

10. **Claim 19** is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0193609 A1 to *Phan et al.* ("*Phan*") in view of U.S. Patent No. 5,630,116 to *Takaya et al.* ("*Takaya*") in further view of U.S. Patent Application Publication No. 2005/0063401 A1 to *Kenner et al.* ("*Kenner*") in further view of U.S. Patent Application Publication No. 2003/0195950 A1 to *Huang et al.* ("*Huang*").

As to **claim 19**, *Phan and Takaya* discloses a method for managing a file in a network system, in which one or a plurality of slave devices and one master

device for multimedia information are connected by the network as discussed in claim 16.

*Phan* also discloses distributing retrieving the integrated directory list (§0052, §0053). Here, the consolidated master CDS is sent to all control points. A new device would receive the consolidated master CDS.

*Phan and Takaya* do not expressly disclose selecting a file to be used with a cursor out of names of files displayed by the means for retrieving and displaying the integrated directory list;

checking if there is a file equivalent to the selected file;

when there is the equivalent file, comparing data transmission speeds of devices for multimedia information which store files; and

when a data transmission speed of a device which stores the equivalent file is higher than a data transmission speed of a device which stores the selected file, replacing the selected file with the equivalent file.

*Kenner* discloses selecting a file to be used with a cursor out of names of files displayed by the means for retrieving and displaying the integrated directory list (§0132, §0133);

when there is the equivalent file, comparing data transmission speeds of devices for multimedia information which store files (§0080); and

when a data transmission speed of a device which stores the equivalent file is higher than a data transmission speed of a device which stores the selected file, replacing the selected file with the equivalent file (§0133, §0134, §0135).

*Kenner* does not expressly disclose checking if there is a file equivalent to the selected file.

*Huang* discloses checking if there is a file equivalent to the selected file (§0116). However, *Kenner* assumes that an equivalent file exists on another box because of the mirroring nature of the system it describes (*Kenner*, §0128).

*Phan, Takaya, Kenner and Huang* are analogous art because they are from the same field of endeavor with respect to file transfer and management.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate the file equivalency check of *Huang* in the file switch-off system of *Kenner* within the master device system discussed in *Phan and Takaya*. The suggestion/motivation would have been a need to lower network congestion by funneling requests to the most appropriate location (*Kenner*, §0029) but to ensure that copy of the requested file exists first (*Huang*, §0016).



***Allowable Subject Matter***

11. **Claims 20 and 21** are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to TAYLOR ELFERVIG whose telephone number is (571)270-5687. The examiner can normally be reached on Monday - Thursday, 8:00 am - 4:00 pm EST..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Derrick Ferris can be reached on (571)272-3123. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Art Unit: 4127

/T. E./

Examiner, Art Unit 4127

/Derrick W Ferris/

Supervisory Patent Examiner, Art Unit 4127